



Higher Technical School of Agricultural Engineering

UPCT



WATER TREATMENT IN AGROALIMENTARY INDUSTRY

Qualification:

Degree in Engineering Agri-food and Biological Systems

Course 2015/2016

1. Subject information

Name	Water Treatment in Food Industry				
Matter*	water treatment				
Module*	optional subjects				
Code	518109011				
Degree	Degree in Agricultural Engineering and Biological Systems				
Study plan	2014				
Centre	Higher Technical School of Agricultural Engineering				
Type	optional				
Teaching period	Four-month period	Four-month period	2 nd	Course	4Th
Language	Spanish				
ECTS	3	Hours / ECTS	30	Total workload (hours)	90

* All terms marked with an asterisk are defined in *References for teaching at the UPCT and Glossary of terms*: <http://repositorio.bib.upct.es/dspace/bitstream/10317/3330/1/isbn8469531360.pdf>

2. Teacher information

Lecturer in charge	Juan Ignacio Moreno Sánchez		
Department	Chemical and Environmental Engineering		
Knowledge area	Chemical Engineering		
Location of the office	Paseo Alfonso XIII, ETSINO building office 0.34		
Phone	968325561	Fax	968325555
E-mail	Juani.moreno@ Upct.es		
URL / WEB	Virtual classroom		
Timetable available / Tutorials	Tuesday and Thursday from 10-13 hours. Open schedule morning		
Location during the tutorials	Paseo Alfonso XIII, ETSINO building office 0.34 or by e-mail		

3. Contents

3.1 Contents curriculum related to the subject

3.2 English program theory (Teaching units and topics)

I. Introduction

- T1. Water purification and wastewater Characteristics.
- T2. Food industry water
- T3. Water treatment food industry
- T4. Wastewater treatment
- T5. Other methods of wastewater treatment in the food industry.

4. Bibliography and resources

4.1 Basic bibliography*

- Arboleda Valencia, I. (2000). Teoría y práctica de la purificación del agua. McGraw Hill
- Degrémont, 1979. Manual Técnico del Agua. 4ª Edición. Degrémont. Bilbao, 1216 pp
- García Garrido, I. (1988). Agua para la industria. SPuPV; Valencia
- Hernández Muñoz, A. 2001. Depuración y Desinfección de Aguas Residuales. 5ª Edición. Colegio de Ingenieros de Caminos, Canales y Puertos. Paraninfo. Madrid, 1151 pp.
- Seoanez Calvo. M. (2003). Manual de tratamiento, reciclado, aprovechamiento y gestión de las aguas residuales de las industrias agroalimentarias. Mundi Prensa.
- Metcalf & Eddy, 1998. Ingeniería de aguas residuales. Tratamiento, vertido y reutilización. 3ª Edición. McGraw-Hill. Madrid, 1485 pp.
- Nalco (1993). Manual del agua. McGraw Hill, Madrid.
- Romero Rojas, J. A. 1999. Tratamiento de aguas residuales por lagunas de estabilización. 3ª Edición. Alfaomega. México. 281 pp.

4.2 Complementary bibliography *

- American Water Works Association, 2002. *Calidad y Tratamiento del Agua. Manual de Suministros de Agua Comunitaria*. McGraw-Hill: Madrid. 1231 pp.
- Nemerow, N.L. y Dasgupta, A. 1998. *Tratamiento de Vertidos Industriales y Peligrosos*. Díaz de Santos: Madrid, 822 pp.

4.3 Network resources and other resources

Virtual classroom of the subject : <http://moodle.upct.es>